

File
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T-11500/2
DOS/2

6280
PAC

MAY 20 1986

Environmental Engineer

Assistant Chief of Staff, Facilities, Marine Corps Base, Camp
Lejeune

**ENVIRONMENTAL CONSIDERATIONS OF 2D MARINE DIVISION PROPOSED
MANEUVER AREAS AND RANGE ENHANCEMENTS**

- Ref: (a) CG, 2d MarDiv ltr 11102 over G-4 Engr dtd 29Apr86 w/Encl
 (b) MCO P11000.8B
 (c) 40 CFR Parts 1500-1508, Regulations of the National
 Environmental Policy Act Council of Environmental Quality,
 Executive Office of the President
 (d) CG, MCB, CamLej ltr 11000 NREAD dtd 14Apr86 w/End

Encl: (1) Environmental Policy Requirements, Range Master Plan

1. NEPA Requirements: Projects proposed in reference (a) involve potentially significant adverse environmental impacts with likely public controversy. Prior to initiating these projects, approval of an Environmental Assessment (EA) by the HQMC Environmental Impact Review Board is required per reference (b). Further, the EA process must also include public review and publication of a Finding of No Significant Impact, either by CMC or MCB. Four proposed projects of reference (a) for the Sandy Run Training Area should also be addressed in an EIS.

2. Options: Projects listed in reference (a) must be addressed in one of these two options:

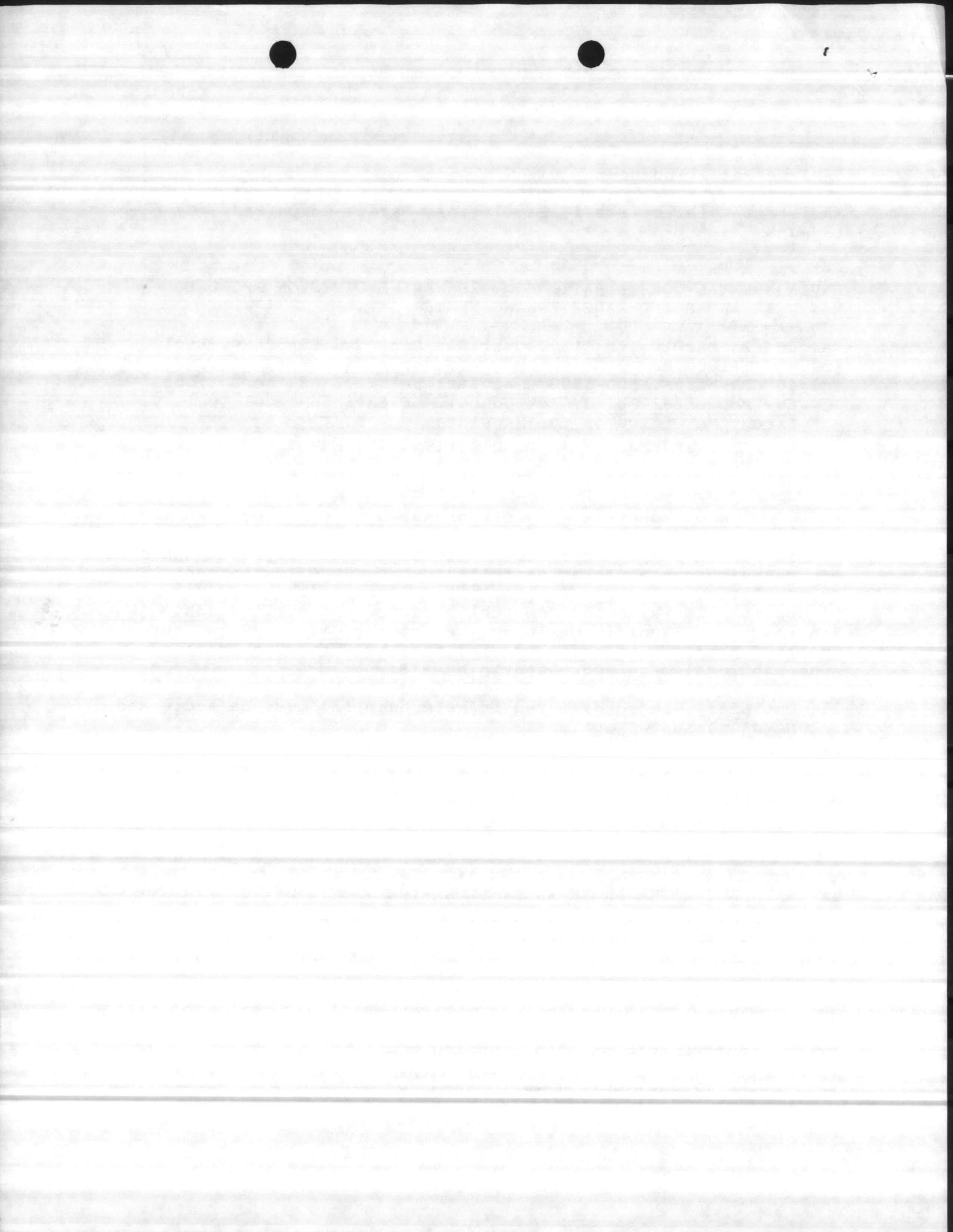
a. Environmental Impact Statement (EIS): Time to completion = 16-20 months, approximate cost: \$150K

b. Environmental Assessment(s) (EA): Time to completion = 12-18 months, approximate cost: \$100 - 150K

3. Recommend EIS: As indicated in the enclosure, development of an EIS appears the most favorable option. This EIS should also assess similar range projects listed in the Special Training Analysis. These include conversion of "F" Area from Range Surface Danger zones to maneuver area and construction of "G" Area Ranges.

4. Funding: FY-87 funding for environmental documentation is the responsibility of CG, MCB. Per reference (d) which submitted the FY-87 Annual Operation Plan, funding was shown for the EIS for land acquisition (\$200K) and "envir documentation" for Training Area Master Plan (\$50K). Per phoncon with CMC (LFL), 11 May 1986, Mr. Hubbell explained there is not a "dedicated" source of funds

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5/20/86
KAC



Subj: ENVIRONMENTAL CONSIDERATIONS OF 2D MARINE DIVISION
PROPOSED MANEUVER AREAS AND RANGE ENHANCEMENTS

managed by LFL for this purpose. Thus we would request funds from CMC-FD. Concurrently, the scope of the EIS should be agreed upon by MCB staff with input from CMC and LANTDIV.

5. Response to AC/S, Training & Operations: The Division Engineer should be commended for developing this comprehensive work plan, which has considered a number of environmental impacts in its preparation. However, to enable the completion of required environmental documentation, the milestones for the larger projects must be delayed.

6. "Minor" Projects: Troop training or maintenance projects can be completed for many Division projects having insignificant environmental impacts. Per BO 11000.1B, approval of preliminary environmental assessments (PEA's) is adequate to initially assess these projects:

- 1-86 Mechanized Maneuver Course - portion known as Mobility/Counter Mobility Course (PEA done)
- 2-86 Engineer Training Area (ETA), Phase I (PEA done)
- 3-86 Bivouac Site, K-Area (PEA done)
- 4-86 Area 2 "O" Course
- 6-86 LAV Firing Lanes
- 7-86 G-6 Range Electric Service
- 8-86 New gun positions (PEA done for GP 31, 39)
- 2-87 ETA, Phase II (PEA done)
- 4-87 Expand gun positions - project complete
- 5-87 Bivouac sites LZ's Falcon and Lark
- 6-87 F-18 Subcal range (PEA done in 1983)
- 10-87 Bridging sites for TLB testing
- 13-87 Airframes - No PEA needed
- 15-87 Confidence Course, French Creek
- 5-86, Rapelling Towers - No PEA required
- 11-37, " " "
- 2-88, " " "
- 3-88 " " "



Subj: ENVIRONMENTAL CONSIDERATIONS OF 2D MARINE DIVISION
PROPOSED MANEUVER AREAS AND RANGE ENHANCEMENTS

The Mobility/Counter Mobility Course of Project 1-86 has been approved by the MCB Environmental Board to meet suspense dates for testing a new engineer vehicle known as COV. This site is under construction; no significant impacts are anticipated. Similarly, the G-4 range projects on Piney Green Road have insignificant impacts and are underway.

7. Summary I recommend the following actions be initiated:

a. Advise AC/S Trng of need for envir documentation and offer to assist 2d Marine Division with projects.

b. Advise 2d Marine Division of situation, and continue troop training project planning for smaller scale projects and those with completed PEA's.

c. Determine scope of EA/EIS with CMC, LANT input.

d. Request 87 funding for EA/EIS from CMC (FD).

R. E. ALEXANDER

Writer: R. E. ALEXANDER
Typist: CPL MCGUIRE, 20MAY86, FAC
WP 331



ENVIRONMENTAL POLICY REQUIREMENTS
RANGE MASTER PLAN

1. Most of these actions are "connected actions" or "interdependent parts of a larger action" i.e., the MCB Range Master Plan which should be addressed in an EIS, per 40 CFR Part 1508.25 of reference (c).

2. EA's are mandatory per reference (b) for large projects listed in reference (a):

G-10 Impact Area Expansion, Mechanized Maneuver Course, Tank Trail repairs (four FY-87 M-2 projects totaling \$2,656K), and dredging associated with LCU operations proposed at Mile Hammock Bay.

3. EA's are also mandatory per reference (b) for development of "G" Area Ranges and conversion of "F" Area from Range firing to maneuver area (one action) which are listed in the Special Training Analysis.

4. For project 3-90 to develop Landing Craft, Air Cushioned (LCAC) operations and facilities at Camp Lejeune, an EIS is likely to be required based on recent experiences at Little Creek and Ft. Eustis, VA., and Camp Pendleton, CA.

5. Manpower resources, in terms of numbers and type of professional disciplines, are not available at Camp Lejeune or 2d Marine Division to complete EA's in an expedited time frame as shown in reference (a).

6. The format and content of an EA is the same as an EIS, per reference (b).

7. An EIS may still be required after doing the EA if one of the following applies:

a. Proposal is a "major federal action significantly affecting the quality of the human environment" (not likely in this case).

b. Proposal has potentially significant adverse environmental impact (possible, but not certain either way).

c. Proposal is controversial for environmental reason (yes, is likely to be).

8. The time required to develop and process an EIS (18-24 months) may be less than the time required to prepare and process several EA's for these actions.

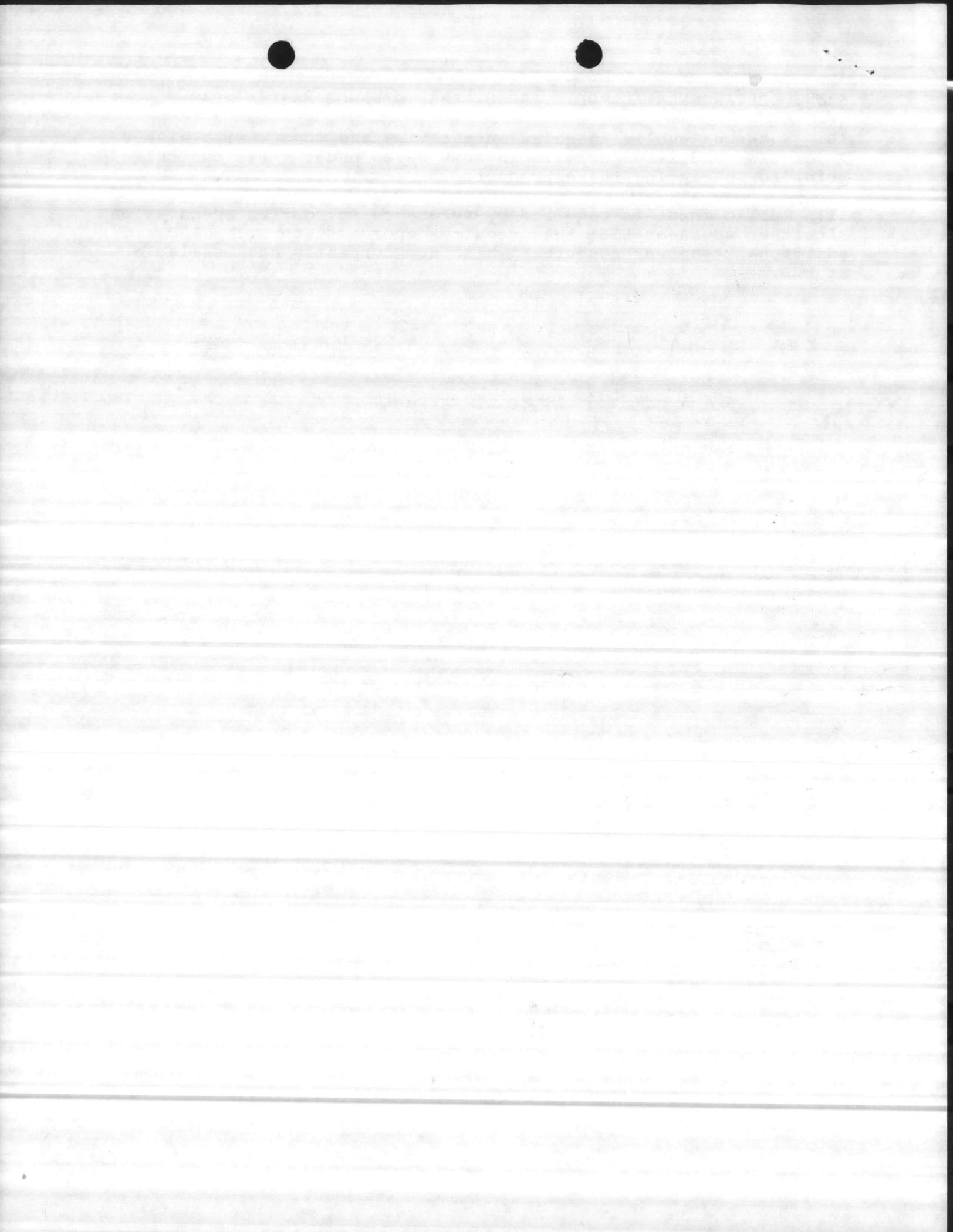
9. The cost of an EIS for these actions (estimated at \$150K) is about the same, maybe less than several EA's at \$20-30K each.



Subj: ENVIRONMENTAL POLICY REQUIREMENTS RANGE MASTER PLAN

10. Numerous public agencies must review and concur with either EA or EIS, and issue permits in some cases under their own rules prior to initiating these projects.

11. Public input is required by reference (c) during preparation of either an EA or EIS; this requires coordination with JPAO and additional manpower resources which are currently not available at MCB.



NATURAL RESOURCES AND ENVIRONMENTAL AFFAIRS
Marine Corps Base
Camp Lejeune, North Carolina 28542

21 Oct 86

Date

From: Director

To:

Peter Black

Subj:

Draft a memo to AC/S Fac.
advising Col D. or to what we have
done ^{in G-10} and what we need to proceed.
Make ref to meet with. Jim + Bob
about 1 month ago

See attached

10900



Danny DDP
Pete PBB
Charles CDP

UNITED STATES MARINE CORPS
MARINE CORPS BASE
CAMP LEJEUNE, NORTH CAROLINA 28542-5001

^{DDP}
T-11000/2
IN REPLY REFER TO:
11000
TRNG/OPS
007 0 1015

From: Commanding General, Marine Corps Base, Camp Lejeune
To: Commanding General, 2d Marine Division, FMF, Camp Lejeune,
NC 28542-5500

Subj: MANEUVER AREAS AND RANGE ENHANCEMENTS

Ref: (a) CG 2d MarDiv ltr 11102 G-4 ENGR dtd 29 Apr 86
(b) CG MCB Camp Lejeune ltr 11000 TRNG/OPS dtd 18 Sep 86

1. The reference outlined maneuver area/range needs for the 2d Marine Division and provided a prioritized project listing for consideration. A comprehensive review of the reference has been conducted by both the Facilities and Training/Operations Departments and while the concept is concurred in, the timing, completion dates, etc., are not feasible due to funding constraints or the requirement for environmental impact reviews. Projects for FY-86 were developed in July/Aug 1985 and since several of those approved could not, for a variety of reasons, be completed they have been moved to FY-87.
2. The FY-87 Minor Construction Review Board met on 4 September 1986. The following comments are provided for clarity and common understanding.
 - a. Mechanized Maneuver Course. No funding was provided; an Environmental Assessment (EA) is currently being prepared and the project must be approved by the local Environmental Impact Review Board (EIRB) before even timber harvest, troop training projects, or projects involving reserve units can commence. Portions of the project far exceed the funding authority of this command and assistance will have to be sought from Headquarters, U. S. Marine Corps.
 - b. Engineer Training Area (ETA). Phase I with some exceptions, particularly water and power, is complete and official use/designation of the area effective 1 October 1986 was provided in reference (b). The FY-87 Minor Construction Review Board allocated \$86,000 for completion of Phase II.
 - c. Battalion Expeditionary Bivouac Site. Troop training project complete.
 - d. Obstacle Courses. Troop training project in the ETA is complete. Three other courses were approved by the FY-87 Minor Construction Review Board for completion as troop training projects (Area 1/2; French Creek; and Camp Johnson).
 - e. Rappel Tower. Nearing completion.
 - f. LAV Firing Lanes. This project has been placed on hold pending recommendations from 2d LAV Battalion based on deployment experience at various Army bases.





UNITED STATES MARINE CORPS
MARINE CORPS BASE
CAMP LEJEUNE, NORTH CAROLINA 28542-5001

DD8
T-11000/2

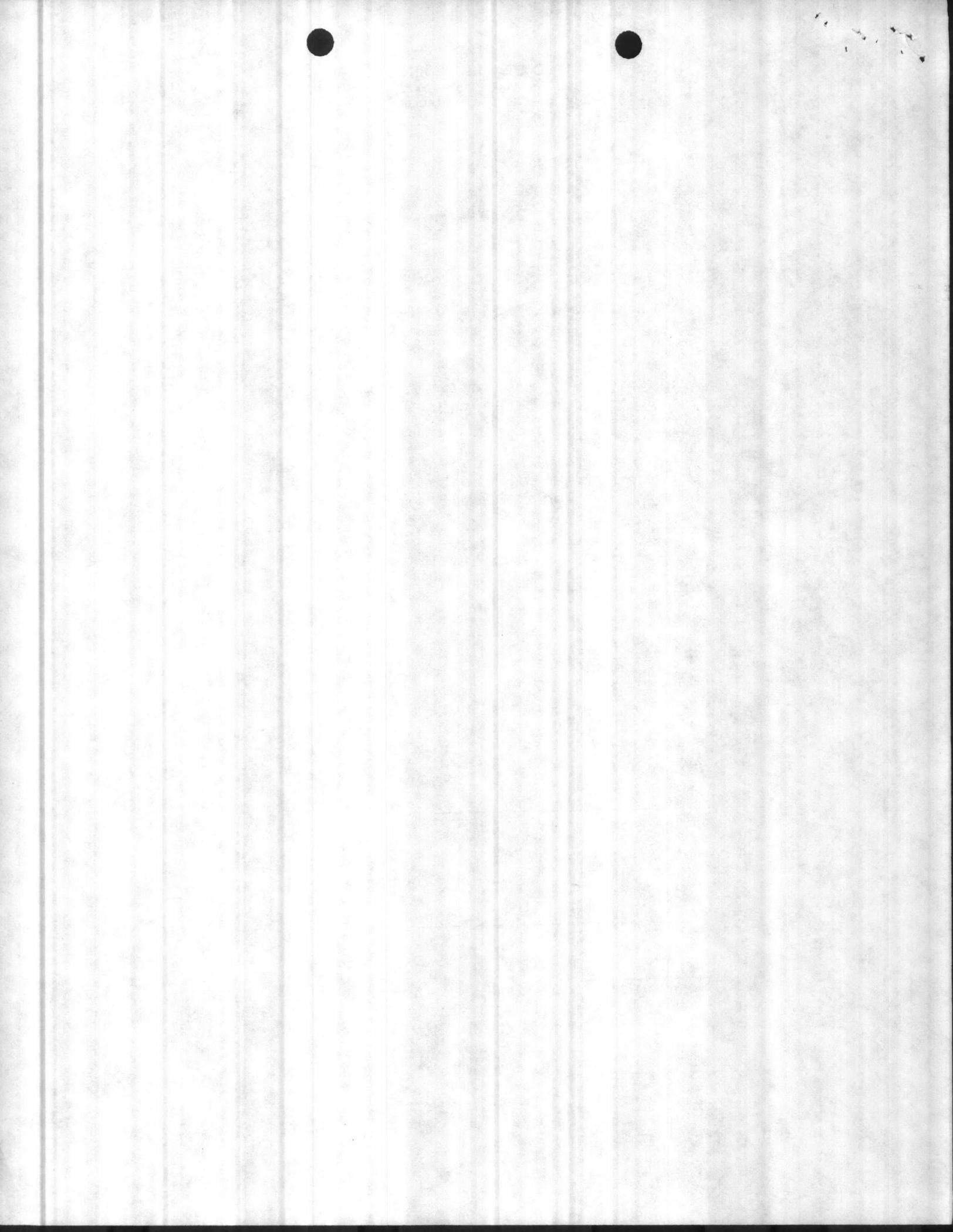
IN REPLY REFER TO:
11000
TRNG/OPS
007 0 1986

From: Commanding General, Marine Corps Base, Camp Lejeune
To: Commanding General, 2d Marine Division, FMF, Camp Lejeune,
NC 28542-5500

Subj: MANEUVER AREAS AND RANGE ENHANCEMENTS

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Subj: MANEUVER AREAS AND RANGE ENHANCEMENTS

g. G-6 Range Upgrade. Currently under contract.

h. New Artillery Gun Positions. Five positions were approved for funding by the FY-87 Minor Construction Review Board: 31, 34, 39, 40 and 41. These positions, provided by the 10th Marine Regiment, differ from those submitted by reference (a). Adjustments can be made if necessary. These were listed as troop training projects.

✓ i. G-10 Impact Area Expansion. No funding was provided. An Environment Assessment (EA) is currently being prepared and the project must be approved by the local EIRB before any work can commence. This remains the highest priority project from a safety and training capabilities standpoint as it has been for nearly two years. Upon approval by the EIRB, funding will be requested as necessary to accommodate this project.

3. The remaining projects (with a few exceptions) are beyond FY-87 funding capability and should be re-evaluated and included in requests for FY-88 and later. The exceptions include:

a. G-7 Moving Target Range. Submitted to HQMC as an R-2 project for FY-87.

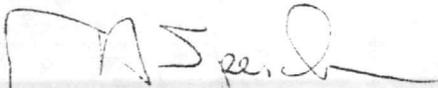
b. Air Assault Landing Zone. USAF representatives visited Camp Davis and indicated that with minor repairs improvements to the runways, either could qualify as an AALZ. Options include expanding the current lease and waiting for the land acquisition project.

c. Company Live Fire Range. Will be designed to allow fire and maneuver from Sneads Ferry Road east toward the existing TLZ Crow and old engineer training area.

d. Airframe/Mock-ups. An active effort to locate actual airframes is underway and five mock-ups have been funded in FY-87.

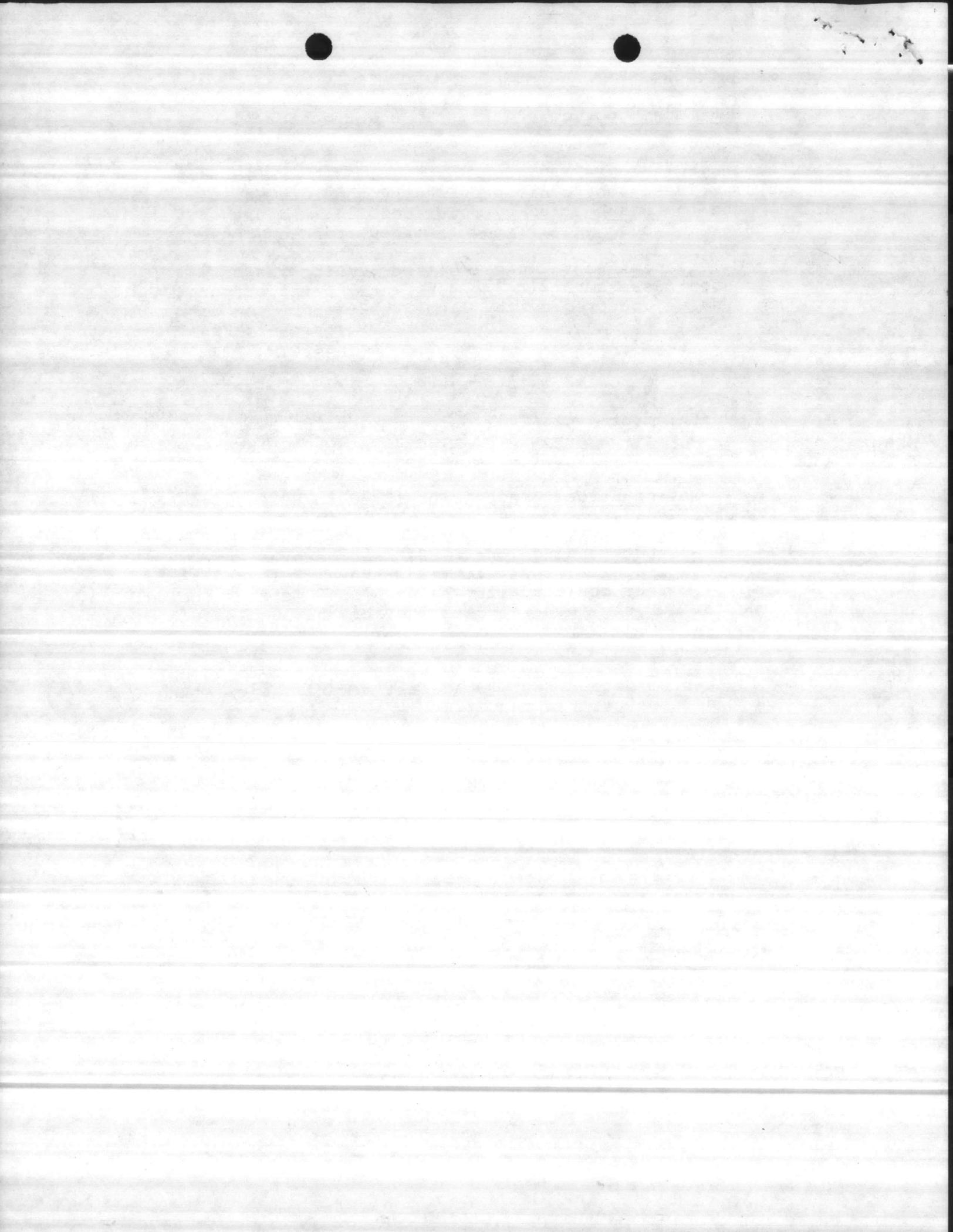
e. MOUT. Remains on target as priority number one for FY-88 MILCON.

4. A review of remaining FY-86 and all FY-87 projects indicate a large number have been proposed and accepted by unit representatives of both the Division and 2d FSSG as troop training projects. Careful and continuous coordination of available assets and prompt material requisitioning will be required to accomplish this workload.



J. A. SPEICHER
By direction

Copy to:
CG, 2d FSSG
AC/S, FAC
BMAINT
→ NREAD
TFAC





From Capt Mathews 2Dw
Bldg 521 at 1721, 5527, 1640

UNITED STATES MARINE CORPS
10th Marines, 2d Marine Division, FMF
Camp Lejeune, North Carolina 28542

IN REPLY REFER TO
29 July 1986

G-10 Expansion Phasing

I. Phase I total acreage (4 Grid Squares)

1. Timber Harvest/Clearing

Southern top half of G-10 and Northern/Eastern Boundaries of Exp.

Grids 9054 3445	9451 3447
9062 3345	9319 3351

500 acres (2 Grid Squares) and Northern/Eastern 250 acres.

2. Stations 8, 7, 6 & 5 (Clear complete fields of visibility 250 acres (1 Grid Square) Timber Harvest/Clearing (Station 8 Scattered Clearing leave 30 trees per acre)

3. Tank Trail Improvements from OP-5 to OP-3
Landfill Movement (potential problem)

4. Barrier Emplacements (earth) along existing trails or new stations

II. Phase II

1. Timber Harvest/Clear G-10 bottom half 625 acres 2.5 Grid Squares

2. Stations 4, 3, 2 & 1 Timber Harvest/Clear 375 acres 1.5 Grid Squares

3. Tank Trail Improvements
Op-5 to Station 4

4. Barrier Emplacements
Along existing trails or Stations 4,3,2 & 1

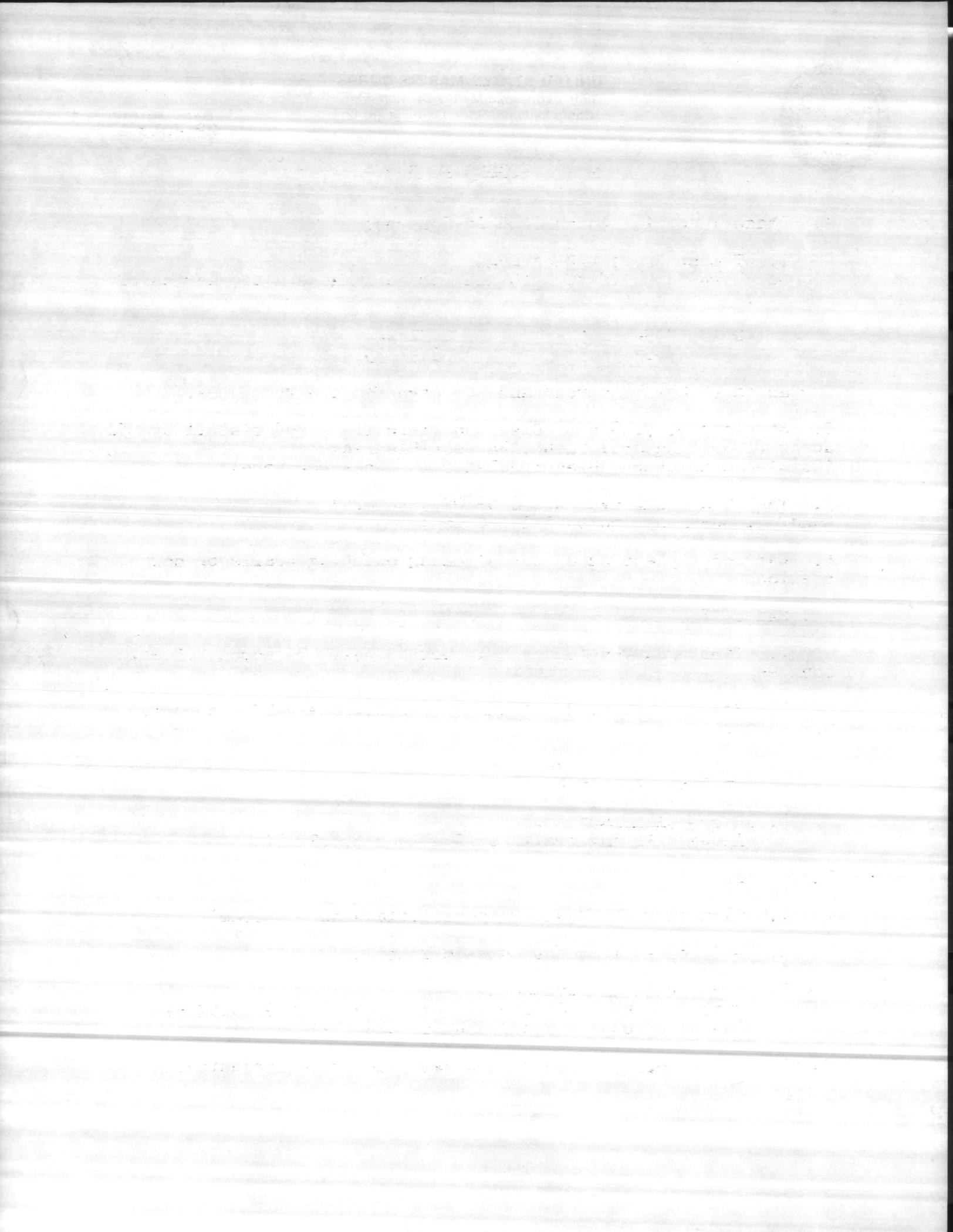
III. Phase III

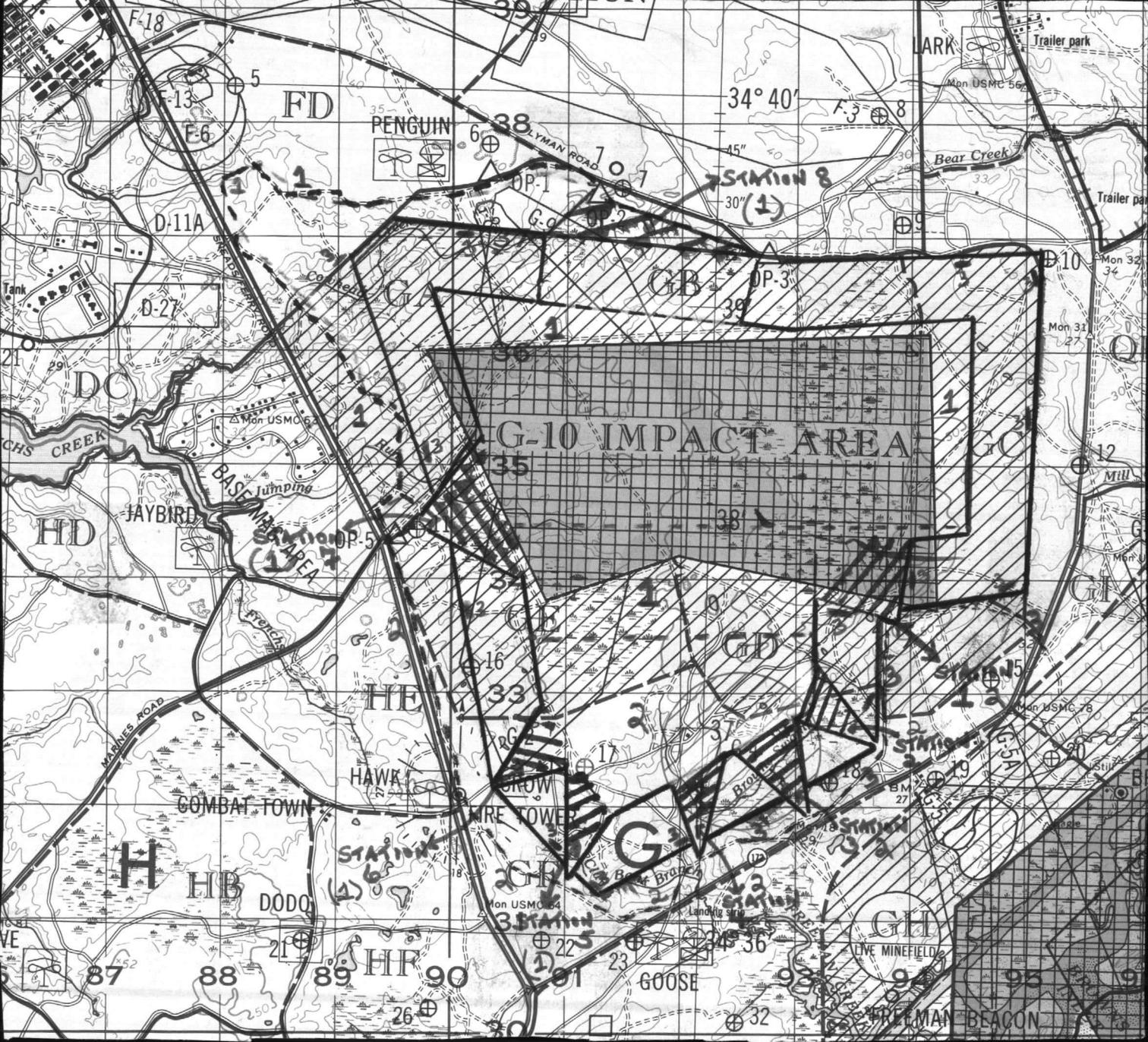
1. Clear any residual 125 acres (planning purposes)

2. Barrier emplacement outside stations

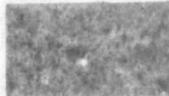
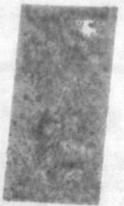
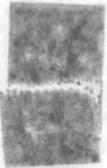
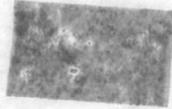
3. Tank Trail Improvements
Station 4 up to Station 1 inclusive of Grid 95153347
(Requires concrete crossing across 172)

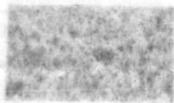
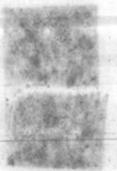
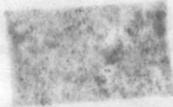
Total Acreage: 8.5 Grid Squares or 2125 acres in Expansion.













Working Copy 30 July 1100

UNITED STATES MARINE CORPS
Marine Corps Base
Camp Lejeune, North Carolina 28542-5001

NREA

IN REPLY REFER TO:

6280
FAC
24 JUL 1986

From: Commanding General, Marine Corps Base, Camp Lejeune
To: Commanding General, 2d Marine Division, FMF, Camp Lejeune, NC 28542-5500

Subj: ENVIRONMENTAL ASSESSMENT FOR TRAINING FACILITY IMPROVEMENTS

Ref: (a) CG 2dMarDiv CLNC ltr 11000 DIV G-4 ENG of 10 Jun 86 w/encls
(b) CG 2dMarDiv CLNC ltr 11000 DIV G-4 ENGR of 25 Mar 86 w/encls

1. The purpose of this letter is to establish a working group agreement between Marine Corps Base and the 2d Marine Division, for mutual staff support, to prepare an Environmental Assessment (EA) for the 2d Marine Division's proposal to expand the G-10 Range and establish a Mechanized Movement Course (MMC).

2. Reference (a) provided a Preliminary Environmental Assessment (PEA) for the proposed expansion of the G-10 Range. Reference (b) provided a PEA for the proposed MMC. The Marine Corps Base Environmental Enhancement Impact Review Board met on 17 July 1986 to review the PEA's submitted by references (a) and (b). As indicated both during this meeting and in the documentation submitted by references (a) and (b), there are proposed actions that may have potentially significant adverse impacts on the environment. These proposed actions require advisory opinions of other government agencies which must be made part of the Marine Corps Base EA forwarded to HQMC for review by Headquarters Marine Corps Environmental Impact Statement (EIS) Review Board.

3. The need to expedite completion of the EA as expressed in reference (a) is recognized. In order to accomplish this, the combined efforts of Division and Base personnel working as a project team are required. This team's work is estimated to extend for five to six months during preparation of an EA document for initial review.

a. The project team should be comprised of a staff representative from each of the following offices:

2d Marine Division

Marine Corps Base

- Division Engineer
- 2d Tank Battalion
- 10th Marine Regiment

- Training and Operations Dept.
- Natural Resources & Environ. Affairs Div.
- Facilities Department

Capt M. Thomas 1721/5527/1040
DAG 521

2 JUL 1986

1 JUL 1986

PROPOSED SOLUTIONS

Subj: ENVIRONMENTAL ASSESSMENT FOR TRAINING FACILITY
IMPROVEMENTS

b. Personnel should be assigned to this team on a part-time basis under the direction of the Marine Corps Base Training and Operations Department Project Officer. Technical assistance in developing the EA will be provided by the MCB Environmental Engineer.

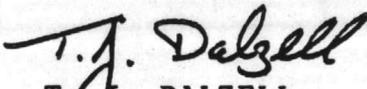
c. The function of the team will be to prepare an EA in accordance with current HQMC policy. This work entails compiling existing data, some field data collection and locating project sites, consulting with state and federal agencies, and preparing a draft EA to be internally staffed prior to publication.

(1) Base personnel will provide technical assistance, access to data, and assist in agency consultations such as U.S. Fish and Wildlife Service. Base personnel will also handle arrangements for "outside" expertise, including funding and administering contracts or agreements to obtain data as required. Base Personnel will arrange the publication of the Finding of No Significant Impact upon completion of the EA.

(2) Division personnel will compile the data and maps, conduct field work, assist in agency consultations, and prepare the manuscript for the EA. This includes writing and typing the EA per the format and content of MCO P11000.8B and reproduction of the draft and final EA.

4. Marine Corps Base is committed to a timely conclusion of this effort; however, a detailed set of procedures under the National Environmental Policy Act must be followed. These procedures require approval by a number of North Carolina and federal agencies, as well as public review of the EA's conclusions.

5. We request your review of this proposed agreement. The terms are flexible on our part. As a first step, recommend a meeting on 25 July 1986 at 1330, Facilities Conference Room, to develop a work plan with milestones, assign responsibilities, and begin the assessment process. Following your review and concurrence of this agreement, we will convene the project team.


T. J. DALZELL
By direction

Copy to:
CMC (LFL)



The first part of the report covers the background and the scope of the project. It also discusses the objectives and the methodology used in the study.

The second part of the report describes the results of the study. It includes a detailed analysis of the data and a discussion of the findings. The report also includes a conclusion and some recommendations for further research.

The third part of the report discusses the implications of the study. It includes a discussion of the limitations of the study and some suggestions for future research. The report also includes a list of references and an appendix.

The fourth part of the report discusses the conclusions of the study. It includes a summary of the main findings and a final statement on the significance of the study.

The fifth part of the report discusses the acknowledgments. It includes a list of the people and organizations that provided support and assistance during the course of the study.

The sixth part of the report discusses the bibliography. It includes a list of the books, articles, and other sources that were consulted during the course of the study.

The seventh part of the report discusses the appendix. It includes a list of the tables, figures, and other materials that are included in the report.

The eighth part of the report discusses the index. It includes a list of the topics and sub-topics that are covered in the report.

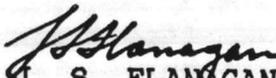
The ninth part of the report discusses the glossary. It includes a list of the terms and definitions that are used in the report.

UNITED STATES MARINE CORPS
2d Tank Battalion
2d Marine Division, FMF
Camp Lejeune, North Carolina 28542

3000
S-3
17 July 1986

From: Commanding Officer
To: Commanding General, 2d Marine Division (Attn: Div ENGR)
Subj: REQUIREMENTS TO ESTABLISH A NEW MECHANIZED MOVEMENT COURSE
Ref: (a) Div Engr Mtg of 25 June 1986
Encl: (1) Proposed Mechanized Movement Course Diagram

1. Per the reference, this Command strongly desires that a new Mechanized Movement Course be established to replace the current mechanized movement area surrounding the G-10 Impact Area to allow for expansion of the G-10 Impact Area for live fire purposes. As the G-10 Impact Area is enlarged, the current movement area will no longer support mechanized training programs. Additionally, this Command concurs with the Division Engineer's approach that an "in-house" Environmental Assessment be done to expedite action toward the goal of a new Mechanized Movement Course.
2. To assist expediting the in-house "EA", the attached enclosure depicts a diagram of what must be done, in priority sequence, to establish a Mechanized Movement Course to support this unit.
3. The enclosure contains data which was compiled after a thorough review of soil trafficability, endangered species locations, and optimum avenues of approach to support a Mechanized Movement Course. The Mechanized Movement Course implementation plan is divided into four (4) phases. It is essential that work be done in this phase sequence to allow this unit to use part of the new Mechanized Movement Course while the G-10 Impact is simultaneously enlarged. The work plan includes proposed timber harvesting, road improvements, proposed bridge sites, and proposed tank pad crossing sites. These engineering improvements must be built in order to ensure that long term soil traffickability does not worsen at an accelerated pace and nullify the use of this new area after a few years.
4. If further information is needed, the point of contact at this Headquarters is 1stLt SCHIEKE, extension 3725.


J. S. FLANAGAN
By Direction

17 JULY 1956

THE NATIONAL GOVERNMENT DEPARTMENT

DEPARTMENT OF THE INTERIOR

WASHINGTON

OFFICE OF THE SECRETARY

MEMORANDUM FOR THE SECRETARY
SUBJECT: [Illegible]

1. [Illegible]

2. [Illegible]

3. [Illegible]

4. [Illegible]

PROPOSED MECHANIZED MOVEMENT COURSE DIAGRAM DATA

Item#	Description	Priority	Remarks
PHASE 1	Timber Harvest Area 1	1	Thinning of timber
	Timber Harvest Area 2	2	Clearing of timber
	Improve Blue Route 1	3	Improve road to class 60 MLC
	Build Bridge 1	4	Build non-std bridge/60MLC
	Build Bridge AVLB site 2	5	Build bridge site for AVLB
	Build Bridge AVLB site 3	6	Build bridge site for AVLB
	Build Tank Cross site 1	7	Build tank cross site 60MLC
	Improve Blue Route 2	8	Improve road to class 60MLC
	Build Bridge AVLB site 4	9	Build bridge site for AVLB
	Improve Blue Route 3	10	Improve road to class 60MLC
PHASE 2	Timber Harvest Area 3	11	Clearing of timber
	Timber Harvest Area 4	12	Clearing/Thinning of timber
	Improve Route Blue 4	13	Improve road class 60MLC
	Improve Route Blue 5	14	Improve road class 60MLC
	Build Tank Cross site 2	15	Build tank cross site 60MLC
	Build Tank Cross site 3	16	Build tank cross site 60MLC
	Build Tank Cross site 4	17	Build tank cross site 60MLC
	Build Bridge AVLB site 5	18	Build bridge site for AVLB
Build Route Blue 6	19	Build road class 60 MLC	
PHASE 3	Timber Harvest Area 4	20	Thinning of timber
	Improve Route Blue 7	21	Build road class 60 MLC
	Build Bridge AVLB site 6	22	Build bridge site for AVLB
	Improve trails blue 8/9	23	Repair existing trails area 5
PHASE 4	Timber Harvest Area 5	24	Thinning of timber
	Build Tank cross site 5	25	Build tank cross site 60MLC
	Build Route Blue 10	26	Build road class 60MLC

NOTES:

1. AVLB bridge crossing sites must have prepared embankments to prevent damage to AVLB's. Also sites must be 48 feet wide or less. AVLB site must be class 60 MLC.

2. Tank Crossing sites must have concrete pads cut in current roads to permit crossing of tracked vehicles. Need class 60MLC. Need these crossing sites to permit full use of Mechanized Movement Course.

3. Expansion of routes into the Mechanized Movement Course is needed to allow battalions to attack on two axes and meet MCATF training objectives as per OH 9-3RevA.

4. Sizes of Timber Harvest by Area: (Approximate)

Area 1	3	sq km
Area 2	8.75	sq km
Area 3	4.5	sq km
Area 4	5	sq km
Area 5	8.1	sq km
Area 6	8.25	sq km
Total	37.6	sq km

